

fr



UNITED STATES PATENT AND TRADEMARK OFFICE

4

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/835,212	04/13/2001	Douglas P. Drees	10007360-1	6102

7590 07/28/2004  
HEWLETT-PACKARD COMPANY  
Intellectual Property Administration  
P.O. Box 272400  
Fort Collins, CO 80527-2400

EXAMINER

BARNES, CRYSTAL J

ART UNIT	PAPER NUMBER
----------	--------------

2121

DATE MAILED: 07/28/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

fr

## Office Action Summary

Application No.

09/835,212

Applicant(s)

DREES, DOUGLAS P.

Examiner

Crystal J. Barnes

Art Unit

2121

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 13 April 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-10 and 12-19 is/are rejected.
- 7) ☒ Claim(s) 11 and 20 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 13 April 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

### DETAILED ACTION

1. The following is an initial Office Action upon examination of the above-identified application on the merits. Claims 1-20 are pending in this application.

#### *Claim Rejections - 35 USC § 102*

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

3. Claims 6 and 15 are rejected under 35 U.S.C. 102(e) as being anticipated by USPN 6,505,248 B1 to Casper et al.

As per claim 6, the Casper et al. reference discloses a method for managing a multiple server computer system on a computer network, the method comprising the steps of: executing an agent (see column 7 lines 39-67, "state diagram") on a remote node (see column 5 lines 64-67, "remote servers 165, 170, 175"); creating a

properties object ("data collection") containing values for certain properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which the agent ("state 205") is executing; an agent ("state 210") initiating contact (see column 8 lines 1-6, "data downloading") with a central management server (see column 5 lines 64-67, "managing server 105"); and the agent ("state 210") passing the properties object from the agent ("state 210") to the central management server ("managing server 105"), whereby the agent ("state 210") reports the properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which it is executing to the central management server ("managing server 105").

As per claim 15, the Casper et al. reference discloses a computer readable medium on which is embedded a program, the program comprising modules that execute a method for managing a multiple server computer system on a computer network, the method comprising the steps of: executing an agent (see column 7 lines 39-67, "state diagram") on a remote node (see column 5 lines 64-67, "remote servers 165, 170, 175"); creating a properties object ("data collection") containing values for certain properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which the agent ("state 205") is executing; an

agent ("state 210") initiating contact (see column 8 lines 1-6, "data downloading") with a central management server (see column 5 lines 64-67, "managing server 105"); and the agent ("state 210") passing the properties object from the agent ("state 210") to the central management server ("managing server 105"), whereby the agent ("state 210") reports the properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which it is executing to the central management server ("managing server 105").

***Claim Rejections – 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claim 1 is rejected under 35 U.S.C. 103(a) as being unpatentable over USPN 6,505,248 B1 to Casper et al. in view of USPN 5,005,122 to Griffin et al.

As per claim 1, the Casper et al. reference discloses a system for managing a multiple server computer system on a computer network, the system comprising: a

central management server (see column 5 lines 64-67, "managing server 105"); one or more remote nodes ("remote servers 165, 170, 175") connected to the central management server ("managing server 105"); a distributed task facility, running on the central management server, that assigns and monitors system management tasks on the remote nodes; and an agent (see column 7 lines 39-67, "state diagram"), running on each remote node ("remote servers 165, 170, 175"), that executes system management tasks (see column 7 lines 42-45, "(performing tasks") and initiates contact (see column 8 lines 1-6, "data downloading") with the central management server ("managing server 105") to report the properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which it is running.

The Casper et al. reference does not expressly disclose a distributed task facility, running on the central management server, that assigns and monitors system management tasks on the remote nodes.

The Griffin et al. reference discloses  
(see column 4 lines 2-15, "... software distribution server nodes 16 ... distribute copies of the software program to selected client nodes 11 under control of a management server 14 ... a single server node may comprise any

combination of a management server 14 ... a software distribution server node 16 ...")

(see column 4 lines 62-66, "A management server node 14 performs management services for managing network operations ... a software distribution server node 16 to perform software distribution services.")

At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to modify network of the method and system for monitoring and dynamically reporting a status of a remote server taught by the Casper et al. reference with the network with cooperating management server node and network service node taught by the Griffin et al. reference to provide a software distribution server communicating over a network, particularly as the network becomes larger and more expensive.

One of ordinary skill in the art would have been motivated to provide a software distribution server communicating over a network to alleviate software management problems by providing a number of functions including verifying that a user has a correct version, installing new versions as they are obtained, and keeping track of software distribution and use for licensing purposes.

6. Claims 2-5 are rejected under 35 U.S.C. 103(a) as being unpatentable over USPN 6,505,248 B1 to Casper et al. in view of USPN 5,005,122 to Griffin et al. as applied to claim 1 above, and further in view of logical reasoning.

As per claim 2, the Casper et al. reference discloses the agent further comprises: a task module (see column 7 lines 42-45, "state 200") that executes tasks ("performing tasks") assigned to the agent by the distributed task facility; a properties module (see column 7 lines 51-55, "state 205") that gathers information ("data collection") describing properties ("system activity information") of a remote node ("remote servers 165, 170, 175") on which the agent is running; and a reporting module (see column 8 lines 2-3, "state 210") that initiates and executes reporting of the status of the agent to the distributed task facility.

The Casper et al. reference does not expressly disclose reporting of the status of the agent to the distributed task facility.

However, it would have been logical for one of ordinary skill in the art to modify the data collection and data downloading to include specific activity information regarding a remote server as a whole and the individual tasks/tools running on the remote server.



At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to further modify the network of the method and system for monitoring and dynamically reporting a status of a remote server taught by the Casper et al. reference and the network with cooperating management server node and network service node taught by the Griffin et al. reference to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server.

One of ordinary skill in the art would have been motivated to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server to enable timely maintenance and rapid diagnostic analysis of servers within a distributed computing network to avoid costly and frustrating server down-time.

As per claim 3, the Casper et al. reference discloses the reporting module (see column 8 lines 2-3, "state 210") reports the properties ("system activity information") of the remote node ("remote servers 165, 170, 175") to the distributed task facility by passing a properties object (see column 6 lines 55-60, "parameter files 180, 185, 190") to the distributed task facility.

As per claim 4, the Casper et al. reference does not expressly disclose the properties of the remote node includes the status of the agent and of the remote node on which it is running.

However, it would have been logical for one of ordinary skill in the art to modify the data collection and data downloading to include specific activity information regarding a remote server as a whole and the individual tasks/tools running on the remote server.

At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to further modify the network of the method and system for monitoring and dynamically reporting a status of a remote server taught by the Casper et al. reference and the network with cooperating management server node and network service node taught by the Griffin et al. reference to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server.

One of ordinary skill in the art would have been motivated to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server to enable timely maintenance and rapid

diagnostic analysis of servers within a distributed computing network to avoid costly and frustrating server down-time.

As per claim 5, the Casper et al. reference discloses the properties object (see column 11 lines 38-45, "Performance Plus Code Module 125") comprises a Java object ("Javascript").

7. Claims 7-10, 12-14 and 16-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over USPN 6,505,248 B1 to Casper et al. in view of logical reasoning.

As per claim 7, the Casper et al. reference does not expressly disclose the creating step comprises specifying the status of the agent and of the remote node on which it is executing.

As per claim 16, the Casper et al. reference does not expressly disclose the properties of the remote node include the status of the agent and of the remote node on which it is executing.

However, it would have been logical for one of ordinary skill in the art to modify the data collection and data downloading to include specific activity information regarding a remote server as a whole and the individual tasks/tools running on the remote server.

At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to further modify the network of the method and system for monitoring and dynamically reporting a status of a remote server taught by the Casper et al. reference and the network with cooperating management server node and network service node taught by the Griffin et al. reference to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server.

One of ordinary skill in the art would have been motivated to include specific activity information regarding the remote server as a whole and the individual tasks/tools running on the remote server to enable timely maintenance and rapid diagnostic analysis of servers within a distributed computing network to avoid costly and frustrating server down-time.

As per claim 8, the Casper et al. reference discloses further comprising creating a properties file object (see column 6 lines 55-60, "parameter files 180, 185, 190") on the remote node ("remote servers 165, 170, 175") containing data ("data files") describing the certain properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which the agent is executing, wherein the properties object ("parameter files 180, 185, 190") is created using

the values of the data ("data files") contained in the properties file ("parameter files 180, 185, 190").

As per claim 17, the Casper et al. reference discloses further comprising creating a properties file ("parameter files 180, 185, 190") on the remote node ("remote servers 165, 170, 175") containing data ("data files") describing the certain properties ("system activity information") of the remote node ("remote servers 165, 170, 175") on which the agent is executing, wherein the properties object ("remote servers 165, 170, 175") is created using the values of the data ("data files") contained in the properties file ("remote servers 165, 170, 175").

As per claim 9, the Casper et al. reference discloses the initiating contact step (see column 8 lines 1-3, "state 210") comprises the agent initiating contact ("downloaded to") with a distributed task facility on the central management server ("managing server 105").

As per claim 18, the Casper et al. reference discloses the initiating contact step (see column 8 lines 1-3, "state 210") comprises the agent initiating contact ("downloaded to") with a distributed task facility on the central management server ("managing server 105").

As per claim 10, the Casper et al. reference discloses the passing step comprises passing the properties object (see column 6 lines 55-60, "parameter files 180, 185, 190") from the agent (see column 8 lines 1-3, "state 210") to the distributed task facility.

As per claim 19, the Casper et al. reference discloses further comprising passing the properties object (see column 6 lines 55-60, "parameter files 180, 185, 190") from the agent (see column 8 lines 1-3, "state 210") to the distributed task facility.

As per claim 12, the Casper et al. reference discloses further comprising initiating the executing step (see column 7 lines 42-49, "state diagram") upon restarting operation of the remote node upon which it resides.

As per claim 13, the Casper et al. reference discloses further comprising initiating the executing step (see column 7 lines 42-49, "state diagram") following a hardware system upgrade to the remote node upon which it resides.

As per claim 14, the Casper et al. reference discloses further comprising initiating the executing step (see column 7 lines 42-49, "state diagram") following

an upgrade or patch to the operating system software on the remote node upon which it resides.

The Casper et al. reference does not expressly disclose restarting operation of the remote node, a hardware system upgrade to the remote node, or an upgrade or patch to the operating system software on the remote node.

However, it would have been logical for one of ordinary skill in the art to modify the data collection and data downloading to include several events that occur to provide monitoring and reporting the status of a remote server to a managing server.

At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to further modify the network of the method and system for monitoring and dynamically reporting a status of a remote server taught by the Casper et al. reference and the network with cooperating management server node and network service node taught by the Griffin et al. reference to include several events that occur to provide monitoring and reporting the status of a remote server to a managing server.

One of ordinary skill in the art would have been motivated to include several events that occur to provide monitoring and reporting the status of a remote

server to a managing server so that a status output could be dynamically generated under several circumstances in response to a request.

***Allowable Subject Matter***

8. Claims 11 and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

9. The following is a statement of reasons for the indication of allowable subject matter:

As per claims 11 and 20, the prior art of record taken alone or in combination fail to teach checking for any outstanding tasks previously assigned to the agent for which the distributed task facility is still awaiting a response from the agent.

***Conclusion***

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.



The following references are cited to further show the state of the art with respect to remote management of computer systems in general:

USPN 6,098,143 to Humpherys et al.

USPN 6,574,729 B1 to Fink et al.

US Pub. No. 2002/0138665 A1 to Sheetz et al.

US Pub. No. 2002/0178297 A1 to Lister et al.

US Pub. No. 2003/0061323 A1 to East et al.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Crystal J. Barnes whose telephone number is 703.306.5448. The examiner can normally be reached on Monday-Friday alternate Mondays off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Anthony Knight can be reached on 703.308.3179. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

cjb  
22 July 2004

*Ramesh Patel*  
RAMESH PATEL  
PRIMARY EXAMINER 7/26/04  
*For Anthony Knight*